WHIRRAKEE

December 2000 Vol. 21 No. 11

Registered by Australia Post. Publication No. VBH4462

MONTHLY NEWSLETTER OF THE BENDIGO FIELD NATURALISTS CLUB

Bendigo Field Naturalists Club Inc.

Address for correspondence: PO Box 396, Bendigo 3552

Office Bearers for 2000 - 2001

President	Barbara Chmielewska	Melaleuca Ave, Longlea	5439 3075
Senior Vice President	Matthew Comer	Main Road, Goornong	
Junior Vice President	Rod Orr	2 Cockerel Court, Bendigo	5443 5668
Secretary	Bill Holsworth	13 Nabilla Crs, Bendigo	5443 4063
Minute Secretary	Jane Cleary	24 Goynes Road, Epsom	5448 4396
Treasurer	Glenise Moors	Mandurang South Rd. Sedgwick	5439 6254
Membership Officer	Kate Lottkowitz	80 Piccaninny Rd, RSD Strathfieldsaye	5439 3157
Excursion organiser	Maurie Lewis		0407 427179
Syllabus organiser	Bill Holsworth	13 Nabilla Crs, Bendigo	5443 4063
Librarian	Diana Collier	31 Milroy Street, Bendigo	5443 0137
Whirrakee contacts	Tom Burton	Tannery Lane, Mandurang	5439 3028
	Sabine Wilkens	82 Somerville Street, Bendigo	5443 2797
		e-mail: s.wilkens@bendigo.latrobe.edu.au	

Membership of the Bendigo Field Naturalists Club is open to all those interested in Natural History. The subscription rates are: Single $34; Family $40; Concession: Single $28.50; Family $34. *Whirrakee* subscription only is $34. These rates include GST.

General meetings are held on the second Wednesday of each month. The venue for General meetings is the Golden Square Senior Citizens Building, Old High Street, Golden Square. Meetings start at 7:30pm and conclude with supper. The Annual Meeting is held in September.

Committee meetings are held on the third Wednesday of each month at 7:30pm. Members of the Committee are the Office Bearers listed above, together with the following members: Darren Green; Maurie Lewis; Kate Lottkowitz; Phil Robertson; Bob Ruddick

Excursions The assembly point for excursions is the Golden Square Senior Citizens Building, unless otherwise specified. Full-day excursions normally commence at 10am (usually on a Sunday); half-day excursions normally commence at 2pm and may be either on a Saturday or Sunday. Full-day or half-day excursions are usually held on the weekend following the General Meeting. Campouts are held several times each year, usually coinciding with long weekends or holiday periods.

The Bendigo Field Naturalists Club has 2 active sub-groups:

Bird Observers Group: meets on the first Friday of the month, at 7:30pm. The venue for meetings is the Golden Square Senior Citizens Building.

President: Anne Bridley
Secretary: Jane Cleary

Mammal Study Group: meets on the fourth Wednesday of the month at 7:30pm in the Golden Square Senior Citizens Building.

Chairman: John Burtonclay, Fadersons Lane, Mandurang (5439 5710)
Secretary: Bill Holsworth, 13 Nabilla Crs., Bendigo (5443 4063)
Equipment Officer: Maurie Lewis (0407 427179)

Front Cover: Photographer: unknown

Tom and Tess Patullo (surrounded by some of their many great grandchildren) on the occasion of their 60th wedding anniversary. Tom died on October 26, aged 92. An article celebrating Tom's life is on page 3 in this issue.

WHIRRAKEE

Monthly Newsletter of the Bendigo Field Naturalist Club
Vol. 21, No. 11, December 2000

Whirrakee takes its name from the Whirrakee Wattle (*Acacia williamsonii*) which is virtually endemic to the Bendigo region

CONTENT

Item	Contributor	Page
Vale Tom Patullo	Peter Ellis	3
When is a beetle not a beetle.....	Tom Burton	6
The Turtles of the Bendigo District, Part Six (Final): Looking to the Future	Darren Green	7
Flowering in the BFNC garden	Matthew Comer	9
Rural Pride Awards 2000		10
Bird Observations from September	Alf Howe	10
Fred's Glenluce wildflower garden	Peter Ellis	11
Report from the VFNCA March 2000 Campout	various authors	11

Authors are responsible for the accuracy of the information they use and also for any opinions expressed in their articles.
Contributions will be included as soon as possible after they are received, although articles received more than one week after the monthly General Meeting will probably be too late for inclusion in the next issue of *Whirrakee*.
Articles in *Whirrakee* may be reproduced, but permission should be obtained from the Bendigo Field Naturalists Club, and acknowledgment should be given to the author and the Club. Some back issues are still available on request.

Editors' Note
We had a terrific talk on Australian snails at the November General Meeting. Unfortunately, the write-up (by me) missed this edition of Whirrakee. We will have the article in the first edition of the new year.
The end of the year also spells the end of the Turtle articles from Darren Green. I have thoroughly enjoyed the series of six pieces. On my last visit to Lake Weeroona, I saw turtles everywhere! Anybody else who might be inspired to write a series about their favourite topic will be most appreciated. We shall miss the regular contributions from Tom Patullo. If we added all the articles he has written (in the later years with Tess's help) they would turn into a fair-sized book!
The December edition will have to keep you going for two months as we do not publish Whirrakee in January. Have a good break if you need one, or exciting times if the year has been too quiet so far.

Vale Tom Patullo 1904-2000

by Peter Ellis

I first met Tom Patullo about the end of July 1963 or 1964; it was when we both joined the Bendigo Field Naturalists Club. I can remember this clearly because of the first two excursions we attended and being new chums, Tom and I travelled together in his old car. That first excursion was lead by Bill Perry to see the *Acacia flexifolia* near the Wallaby Caves. We walked in from Millwood Road for some distance before striking the Flexifolia and it was through tall Bull Mallee. Every now and then there would be a cry of 'Froggattii' or 'Aspalathioides' and other names that were all new to us. Frank Robbins would be darting around pouncing on miniature plant specimens and examining them through his stereo lenses. These were attached to his forehead by a black strip of car tube. Sometimes he'd forget they were down, acting like a magnifying glass and next thing he'd be swatting his face before he'd realise he was being spot burnt by the sun and return the lenses to the up position. Jack Kellam strolled around more leisurely, daggy old brown hat on and cigarette hanging out of the corner of his mouth, stooped over while he engaged in explaining with a sort of a slow drawl how to identify a plant, or peering at the tree tops and naming the bird that had just announced its presence. Arthur Ebdon always keen to give directions would rip a whole tree limb off to draw a map on the ground and you daren't show interest in growing a plant, out would come a big shovel. Bill Perry and Jack Ipsen were much quieter in their explanations, but always very knowledgable and helpful. Bob Allen was another to help with the plants and everyone used to hang on his humorous quips. Yes I remember that first excursion extremely well and the friendship offered by those early club members. The second excursion was next month to the Ridge Road from Elphinstone to Fryerstown and Tom's old car had trouble in making the grade, wheels skidding on the incline and getting stuck in a rut at one stage. It wasn't long before Tom had a brand new car to seek out his Field 'Natting'. A long time friendship was struck up with Bob Allen and there were numerous extra private trips almost every weekend and I recall the news that *Pterostylis robusta* (Autumn Greenhood Orchid) had just been found in the Whipstick. We raced out to the location on the Bagshot North Road to photograph the Autumn Greenhoods. This probably started Tom's passion in photographing and later growing these little terrestrial gems.

At the end of my first year of work in 1965 Tom announced plans for a holiday tour of the Snowy Mountains, inviting Sho Takusuka and myself to accompany him and Tom's son Gordon. It was a fantastic trip and one in which I was to learn Tom had a good knowledge of photography and all those who knew Tom would know how helpful he could be in handing on knowledge. In return, I had by now a reasonable knowledge of the botanical names of the plants he was photographing and would give him the names. Tom's jaw would drop open with a grin, "I'll never learn those" he would exclaim. I think he felt at age of 57 he was a bit over the hill to pick up those things. But it wasn't long after, he had them all within his grip. And at age nearly 55 now I'm going backwards, having forgotten them all. Tom, like Bob Allen, served in New Guinea during the Second World War. Like most of the oldtimers you don't hear much talk about that. But Tom was proud of his training in erecting tents and in fact fastidious in ensuring the pegs were all in line and on the correct angle. There was a particular way in which his 12 X 12 tent and annex had to be erected and I learnt it well, also the order in which to take it down, sweep and fold up. It is advice that has stood by me in many camping trips since.

We had many other trips in those early years such as to the Grampians, another favourite spot and usually with Bob Allen and Colin Bubb in tow.

Tom worked at Clearads, he was the manager or it was possibly even his business. He prepared all the advertisements for the Bendigo Advertiser and made all the plates for each page of the paper as well. In those days it required all of the manual cut and paste for headings, photographs and captions and then photographing and with Nitric acid etching the

page image onto zinc plate for the printing. Clearads was located between the Bendigo Advertiser and Cambridge Press at the rear of both premises.

It was Tom's knowledge of printing and preparative layout that was the basis of the founding of the Bendigo Naturalist and this was Tom's brainchild. This periodical came out quarterly and due to Tom's expertise was of first class professional quality. The magazine committee headed by Tom had Bob Allen, Frank Robbins, Jack Kellam and myself as co-editors and it ran from about 1967 until about 1976. Also at that time Tom's expertise in printing and preparing photographic captions and maps was of invaluable assistance to the club in preparing its Whipstick submissions of the day.

Eventually the rising costs of quality paper and printing and time factor lead to the cessation of production of the Bendigo Naturalist. It was always an effort trying to get good articles ahead of time plus the manual job of assembling the pages to be stapled. For this reason, Tom knowing the difficulty as editor, staunchly provided *Whirrakee* with a regular supply of interesting articles and assisted in its compilation up until when this could be done automatically. Tom had an eye for detail and sharpness of photographs and was extremely meticulous. I recall 35mm slides were not quite as good for printing pictures in those days and Tom went to the expense of buying Bill Perry's camera which took very sharp high quality pictures on a larger frame. Can't think of what it was called, but think it had twin lenses and you peered down through the top of the camera while aiming at the subject. Photography developed into a sort of cult I think in those days and we all wore tartan Tam O' Shanter caps.

It was sometimes a sight to see a circle of Tam O' Shantered Field Nats on their hands and knees (like pigs around a trough as Redvers Eddy would say) photographing a mass of ground orchids. I have such a slide with prominent members of the day including Tom in such a ceremonial position and it's a wonder there were not road accidents as a result of this curious event. But those were the days when many of us were nature photographers with Tom always at the fore.

Another event following that era was a sudden interest in gemstones. There were several excursions usually lead by Frank Robbins and/or Jack Kellam looking for Chert and Red Jasper near Colbinabbin or Lake Cooper and Azurite and Malachite near Mt Ida or Smokey Quartz from beyond Melville's Caves. Then there was the popular pastime of dishing for Zircons and Sapphires in the Loddon River at Ballan or Bullarto, sometimes also picking up a few specks of gold. From memory the formation of the Bendigo Gem Club was an offshoot of this activity, but it certainly became one of Tom's interests for a period of time. He set up his own tumbling machine and regularly brought polished stones of various quartz, agate, chert and so on to the nature table at the meetings.

One of Tom's previous activities in the community came to light at one of the Field Nat socials many years back. This was when Graham Hill and I had his kids plus the Fenselau and Leeson juniors form a bush band for the night, we discovered Tom had been a MC at the dances at the old Spring Gully Hall. This little hall was bought and shifted out to Mandurang and the new hall there built around it. The four posts around the centre of the dance floor are the extent of the old Spring Gully Hall. At any rate on this social night Tom led off the old Barn Dance which I had not seen, it pre-dated the well known progressive version by about 60 years.

Also Brian Brewer ex One Tree Hill Hotel told me when he first arrived at Spring Gully they held dances to the music of one mouth organ player. Tom could 'rattle the bones', I've often wondered if he helped the mouth organ player at times with a bit of rhythm. I expect Tom's MC'ing days were some time in the 1930's and possibly just after the war, not sure, but Gus Hannan was later MC and then by the 60's, Alf Carey.

Tom was also a reciter of bush verse. I recall the first campout we had at Wyperfeld National Park about 1965 or just after. Round the campfire George Walker started it off with his recitation of the 'Phantom Drovers' or something similar in title. Tom laughed a lot at that one and often remarked on it years later. At

other campfires and socials, sometimes with Alan Malone reciting and Nancy Stone of course, Tom's party pieces were the likes of The Loaded Dog, The Bush Christening and When McDougall Topped The Score.
(I wouldn't mind a copy of the Phantom Drovers or Riders if anyone has it)

But if the Bendigo Naturalist and photography were Tom's early interests in the club for which he was well known, then the cultivation of native plants and finally a very special interest in growing terrestrial orchids were probably the peak of his later life as a Field Naturalist.

At his old home at Retreat Rd he built up beds of bush soil retained by walls of sandstone rock and he had two pride of joys. One was the successful cultivation of *Hakea multilineata* from WA, which for many years he would bring in flowering heads for display. The other was his successful growing of Sturt's Desert Pea, which spread over several meters and cascaded over the rock wall, a truly magnificent sight.

Then Tom decided to move out to his block and build at Olympic Parade. He had taken the club to visit his bushland some years earlier and was proud of the stands of *Baeckia ramossisima* for example and one plant of very dark pink Bendigo Wax. Waxie as he called it was one of his favourite plants and he used to reflect on how abundant it once was on One Tree Hill and how it deteriorated after years of illegal picking and excessive grazing by wallabies.

I should have mentioned One Tree Hill itself was of special interest to Tom being at the back door of his old residence. In the Bendigo Naturalist he wrote his 'Walk To The Wunna' outlining how in the early days it was a popular pastime for the neighbourhood to follow a track from just opposite the One Tree Hill Hotel. This was to the summit and back taking in all the vistas of the wildflower gardens of the bush in those days.

Olympic Parade allowed Tom the room to expand his native garden and in particular to start cultivating native orchids in pots. Of course as time rolled on Tom had to move closer into Kangaroo Flat but his interest never waned in his orchids and in providing nature articles for the magazine.

Our President, Barbara Chmielewska had to following to say about Tom:-

I will always remember Tom standing at the door of the Clubrooms waiting for us to arrive for the garden working. I used to get there early to set up and get the tea and coffee ready, but Tom was always earlier than me - "you are late" he would say. He mulched, planted, weeded. He was very supportive of the garden and happy that we are setting it up. He was convinced that when people will see how beautiful the plants are they will want to grow them in their gardens. He loved Bendigo Wax and Orchids were his favourite plants.

Tom knew where to find orchids in the bush. He also grew his own in pots and exhibited them at the Wildflower Show. This year he rang me up and said, "don't worry I will make sure that the orchids will be at the Show". Thanks to him we had a very good display of orchids this year as well, however regrettably Tom could not be present himself.

In conversation with Marilyn Sprague recently she praised Tom for his passion on cultivating plants and orchids in particular. He had tremendous vision for a nonagenarian in wanting to stimulate interest and write articles to educate and encourage people to appreciate and to grow native orchids. He was a believer that cultivation was one means of helping conserve these plants and had provided Marilyn with tubers of every species he owned which she continues to divide and gradually multiply for the eventual nursery trade. One could say Tom's plants are living on in a way he would certainly endorse.

Tom had been a member of the Bendigo Field Naturalists Club for thirty-six years or so, was long term committee member, a past President, and a life member awarded for his many years of dedicated service.
He will be sadly missed and our condolences are extended to his wife Tess and his family.

When is Beetle not a Beetle? When it is a Mimic.

Author: Tom Burton

When asked (on a religious radio program) what one could deduce about God from the study of nature, J.B.S. Haldane replied that God exhibited 'an inordinate fondness for beetles'. This remark was motivated by the fact that there are more species in the beetles Order than there are in any other group. The figure cited in the CSIRO Insects of Australia 2nd ed., is more than 300 000 named beetle species (probably a million or so not yet named), constituting 40% of named insects, 30% of all named animals.

Beetles are classified in the Order Coleoptera. The 'coleo-' part means 'sheath', and the '-ptera' means 'wing' (as anybody whose children are or were dinosaur-addicted may recognize). This refers to the fact that in beetles, the front pair of wings are hardened to the extent that they are useless for flight, but they act as cover ('elytrum') for the back wings. The delicate hind wings are are folded neatly beneath the sheath formed by the front wings when the insect is walking around, but in flight, the hind wings are spread widely. All beetles have hardened, jagged jaws adapted for biting, and many of them are pests, including borers, grain beetles, weevils, and museum beetles (that eat dried specimens).

The beetle that is the subject of this article has no common name. Its scientific name is a ripper—*Metriorrhynchus rhipidius*. This name gives no clue as to the nature of the beast: 'metrio-' = moderate; '-rhynchus' = snout; 'rhipid-' = fan. I don't know how moderate an animal's snout has to be before it can be described as 'moderate' (... moderately?). The 'fan' may refer to the antennae, which are long, thick, and serrated.

This beetle, very common around Bendigo, is about a centimetre long, possibly a bit more for females. The elytra of *M. rhipidius* are orangey-tan, deeply striated, and contrasting with the rest of the body, which is black. At this time of year, they fly a lot, usually a metre or so above the ground, thus a convenient height for catching by hand, or at least swatting to the ground for closer inspection. They belong to a family of beetles (the lycids) whose adults feed on nectar, if they feed at all.

The conspicuous coloration of this beetle has led to its being studied intensively by people interested in the phenomenon of mimicry in the animal Kingdom.

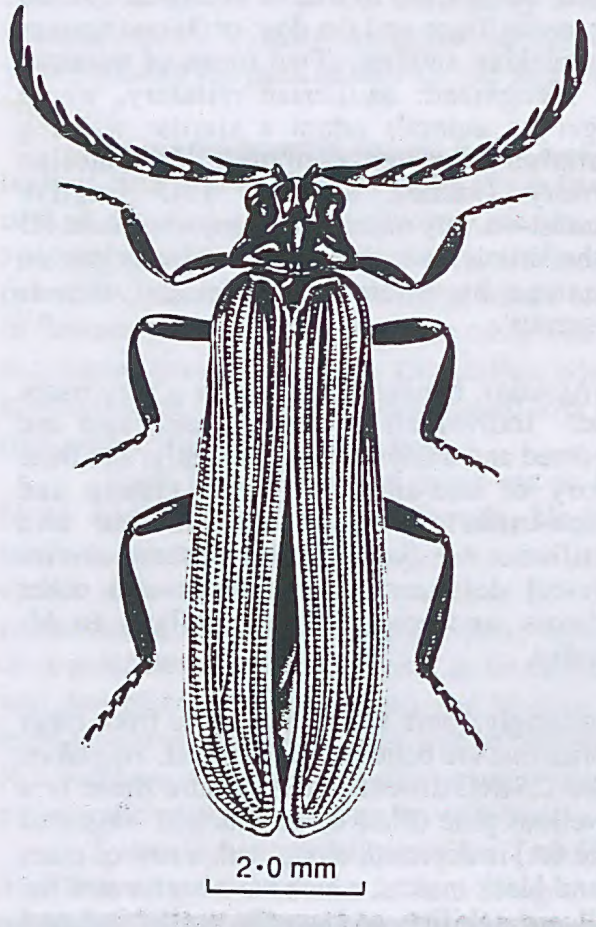
When animals resemble each other closely, biologists look for one of three explanations: 1) they are closely related, like the Tree Sparrows and House Sparrows that squabble over the crumbs that fall from people's lunches in Hargreaves Mall; 2) they are very distantly related, but adapted to similar lifestyles, like the Tasmanian Tiger and the dog; or 3) one species is mimicking another. Two forms of mimicry are recognized: Mullerian mimicry, where dangerous animals adopt a similar warning coloration to deter predators; or Batesian mimicry (named after a 19C English naturalist—a very interesting man, who could fill another article), where harmless animals gain an advantage by resembling a 'model' that is 'dangerous'.

M. rhipidius, handsome as it is, is a very nasty critter. Individuals have been desiccated and powdered and analysed biochemically, and their armory of bad-smelling, bitter-tasting and nausea-inducing chemicals isolated and identified. All lycid beetles possess similar chemical defences against birds and other predators, and are coloured similarly to *M. rhipidius.*

Interestingly, there are many insects from other families that are believed to mimic *M. rhipidius.* In the CSIRO Insects of Australia there is a marvellous plate (Plate 6), in which *M. rhipidius* (Plate 6A) is depicted, along with a row of other tan-and-black insects, which have been tested for smell, palatability, and emetic properties, and found to be harmless. All of them have the striated appearance of *M. rhipidius,* and they are thought to be Batesian mimics of this beetle. The mimics come from a variety of beetle families ... and among them is a moth, which belongs to a completely different Order of insects! The same plate shows red-and-yellow-and-black wasps being mimicked by flies, bees, moths and beetles. The resemblances are remarkable.

So maybe the tan-and-black beetles flying about at the moment are not *M. rhipidius.* Maybe they are just harmless mimics that I cannot distinguish from the real thing. The odds are,

though, that they are *M. rhipidius,* because Batesian mimicry can only work if the model is commoner than the mimics. If the mimics become too common, the young birds will not become sick first time they take a tan-and-black insect into their mouths, and so not learn from this experience never to mess with one of these beetles.



The Turtles of the Bendigo District.
Part Six (Final): Looking to the Future

Author: Darren Green

Thompson (1993) observes that while presently the Macquarie River Turtle is relatively abundant, there seems to be little juvenile recruitment. Consequently, we can expect population densities to decline as old individuals die. Researchers are unaware of the impact that natural predators play upon turtle populations. Introduced species, however, such as foxes are known to have considerable impact on the predation of *E.macquarii* eggs (Thompson 1993). Combined with natural predators, Thompson (1993) estimates a 96% mortality rate on turtle eggs alone in the Lower Murray River, plus post-hatching mortality! The author has seen the impact on *C.expansa* nests along Gunbower Island over eight consecutive years and would agree with Thompson's estimate. No intact nest was discovered. Many nests were dug up, broken eggs shells were scattered around the site, and fox faeces were usually present next to the nesting chamber. The amount of nests would indicate a high population of turtles, however with little juvenile recruitment, the future may look bleak.

Predation on adult *C.longicollis* at Gunbower Island is also relatively high, with one area wielding some 18 freshly killed carcasses (I estimate the oldest carcass to be around two months old). In this area, as well as around Boort, Lake Weeroona, Lake Neanger and many roadways around Bendigo, the author has found many road kill *C.longicollis*. Natural predators on adult *C.longicollis* at Lake Boort possibly include water rats and yabbies, usually during winter when turtles are inactive (indicated by the flesh on the limbs being eaten away, leaving exposed bones). All three species of turtles are regularly caught on fishing lines and often killed to retrieve hooks (many anglers have admitted to cutting the turtles head off in order to retrieve the hook) or to perhaps reduce competition with fish numbers. Research has shown that fish are only a minor part of the turtle's diet and is primarily ingested as carrion (see Thompson).

The Department of Natural Resources considers the Eastern Long-necked and Macquarie River Turtle to be common, and a wildlife licence is not required to keep these animals as pets (most other reptiles, including the Broad-shell Turtle,

require a licence). Species such as the Common Long-necked Turtle, which can be easily poached from farm dams or crossing the road, may be under threat if large numbers are to be taken from the wild. Similarly, eggs may be easily poached using such information as what has been presented in this document (BFNC Turtles of the Bendigo district), with poachers giving false breeding records (ie. saying they bred the turtle, when in reality they poached the eggs from the wild). In defence of the DNR, these turtles are monitored through the pet shop trade, with several poaching cases being won (and further poaching discouraged) in recent years. However, by including these two turtles onto the wildlife licensing system, there is a much greater chance of discouraging people from poaching. Overall, in comparison to the other threats, I believe minor poaching is not a threat to survival of the species. Many people have picked up a turtle and taken it home to keep as a pet (minor poaching), this may have good education value especially if children are concerned, whereas some major poaching cases have been alleged to range between an estimated 80 to 300 turtles per year entering into the pet trade.

Cann (1993) recognises the potential impact that the degradation of our waterways has on turtles. These impacts are all largely unstudied and few resources have been put into this area where turtles are concerned, the few studies that have been done are now over 17 years old with little or no follow up to reverse the situation (Cann 1993). Research has shown that turtles are a vital part of the ecology of our freshwater systems as they literally clean up the waterways by removing carrion and detritus through ingestion. Through his research, Thompson (1993) suggests that as much as 430 tonnes of carrion in the Murray River may be consumed by freshwater turtles each day over the summer period. The disappearance of turtles from this system could, therefore, result in a considerable problem with eutrophication. In places such as the Ganges River (India) there is a problem with eutrophication, and scientists have introduced a carnivorous freshwater turtle to combat the problem.

I believe that the introduced fox is a direct threat to the recruitment of all juvenile turtles and that if these turtles are to escape future extinction, then fox eradication must be enforced. A fox will go to extreme measures for a feed of turtle eggs. For example, a Broad-shell Turtle was observed to lay eggs and cover the nest, the witness then covered the nest with a large log (600mm in diameter). Two days later the witness went back to find that a fox had dug under the log and devoured the eggs. While turtles may appear common today, due to their longevity and juvenile mortality, there scarcity may not be noticed for another twenty or thirty years when the older turtles start to die out. I believe these above mentioned conservation problems need to be addressed if turtles are to survive. I hope people begin to appreciate the role that turtles play in the natural habitat and think about what the future holds for these magnificent beasts.

FURTHER READING

CANN, J. (1993) Do not take our freshwater turtles for granted, in Herpetology in Australia - a diverse discipline, D. Lunney & D. Ayres (Eds.), Surrey Beaty & Sons, Australia, pp363-365.

CANN, J. (1998) Australian Freshwater Turtles, Cann & Beaumont Publishing, Singapore.

CHESSMAN, B.C. (1983) Observations on the Diet of the Broad-Shelled Turtle, *Chelodina expansa*, Aust. Wildl. Res. 10, pp169-172

CHESSMAN, B.C. (1984) Food of the Snake-Necked Turtle, *Chelodina longicollis:* in the Murray Valley, Victoria and New South Wales, Aust. Wildl. Res. 11, pp573-578

CHESSMAN, B.C. (1986) Diet of the Murray Turtle, *Emydura macquarii* (Gray), Aust. Wildl. Res. 13:65-69.

THOMPSON, M.B. (1993) Hypothetical considerations of the biomass of chelid turtles in the River Murray and the possible influences of predation by introduced foxes, in Herpetology in Australia - a diverse discipline, (Eds). Lunney, D. & Ayres, D., Transactions of the Royal Zoological Society of New South Wales, Surrey Beatty & Sons, p.219-224.

Plants Flowering in the BFNC Garden - October and November 2000

Author: Matthew Comer

Some species in the garden are continuing to produce abundant flowers after a very long flowering season. Others, such as the Violet Honey-myrtle, have provided a more short-lived, but very spectacular burst of colour. The numerous species of grasses have become a very prominent feature in November. also some other species such as the Bluebell have started flowering and should continue well into summer.

1= beginning to flower
2= at flowering peak
3= almost finished flowering

Species	Common name	Oct	Nov
Acacia aspera	Rough Wattle	3	
A. ausfeldii	Ausfeld's Wattle	3	
A. brachybotrya	Grey Mulga	2	
Agrostis avenacea			2
Allocasuarina muelleriana	Slatey She Oak	3	
Arthropodium minus	Small Vanilla Lily		3
Arthorpodium strictum	Chocolate Lily	2	
Austrostipa breviglumis	Cane Spear Grass		2
A. elegantissima	Feather Spear Grass	2	2
A. scabra	Rough Spear Grass	2	2
Austrostipa sp.	Spear Grass	1	2
Brachyscome cardiacarpa		2	2
B. dentata		1	3
B. multifida	Cut-leaf Daisy	2	2
Bracteantha viscosa	Sticky Everlasting	2	2
Bursaria spinosa	Sweet Bursaria		1
Calytrix tetragona	Common Fringe Myrtle	2	
Carex appressa	Tall Sedge	2	2
Chrysocepahalum apiculatum	Common Everlasting	2	2
C. semipapposum	Clustered Everlasting	1	2
Dampiera lanceolata	Grooved Dampiera	2	
Danthonia sp.	Wallaby Grass	2	2
Daviesia ulicifolia	Gorse Bitter Pea	3	
Dianella revoluta	Black-anther Flax Lily	2	3
Derwentia perfoliata	Diggers Speedwell	2	2
Dodonaea viscosa	Hopbush (fruit)	2	3
Philotheca verrucosus	Bendigo Wax	3	
Eryngium ovinum	Blue Devil		1
Eucalyptus leucoxylon	Yellow Gum	1	
E. polyanthemus	Red Box	2	
E.viridis	Green Mallee		1
Gonocarpus sp.		1	2
Goodenia benthariana	Clasping Goodenia	1	2
Goodenia varia	Sticky Goodenia	1	
Grevillea alpina	Cats Claws	2	2
Grevillea rosmarinifolia	Rosemary Grevillea	2	
Hardenbergia violacea	Sarsparilla	2	3
Indigofera australis	Indigofera	2	3
Joycea pallida	Red-anther Wallaby Grass	1	2
Kennedia prostrata	Running Postman	2	
Leucochrysum albicans	Hoary Sunray	2	3
Linum marginale	Native Flax	2	2
Lomandra longifolia	Spiny-headed Mat-rush	1	2
Melaleuca decussata	Totem Poles		2
M. wilsonii	Violet Honey-myrtle	1	3
Myoporum parviflorum	reeping Boobialla		1
Olearia ramulosa	Twiggy Daisy-bush	1	
O. teretifolia	Cypress Daisy-bush	3	3
Ozothamnus obcordatus	Grey Everlasting	2	3
Pelargonium australe	Austral Stork's Bill		2
P. rodneyanum	Magenta Stork's Bill	2	2
Pimelea humilis	Common Rice Flower	2	3
Poa labillardieri	Common Tussock Grass	2	2
P. morrissii	Velvet Tussock Grass	2	2
P. sieberiana	Fine-leaf Tussock Grass	2	2
Prostanthera asphalathoides	Scarlet Mint-bush	2	2
Spyridium eriocephalum	Heath Spyridium		1
Themeda triandra	angaroo Grass	1	2
Velleia paradoxa	Spur Velleia	1	2
Wahlenbergia sp.	Bluebell		2
Westringia crassifolia	Whipstick Westringia	2	3
W. eremicola	Slender Westringia	2	3

Smart Gardens Competition 2000 - Results

Congratulations to the gardeners who won the following awards:

Best Native Garden
Winner: Bill and Fay Boyle
Highly commended: Barry Simon

Best Indigenous Garden
Winner: John Robinson
Highly commended: Julie Hurley & Rex Odgers
Merit awards: Daryl and Raye Fleay
John Burtonclay

Keep Australia Beautiful – Rural Pride Awards 2000

Congratulations to Marilyn Sprague who received this State Award for the most environmentally friendly commercial/ industrial business.

"Think globally - act locally" has almost become a cliché, but it fairly describes the activities of Bendigo's Goldfields Revegetation, run by Marilyn Sprague.
Bendigo is situated within the Murray-Darling Basin, the hub of Australia's agriculture and the site of the greatest environmental challenge. The challenge is how to continue production in a sustainable manner, while reducing the impact of salinity and the loss of biodiversity, arising from the excessive clearing of indigenous vegetation and the profligate use of irrigation.

As its name suggests, the company is engaged in rehabilitation and revegetation, mainly in the Central Victorian Goldfields area and the Northern Plains, which demonstrate all the land degradation issues of the Basin. All nurseries supply plants but Goldfield's revegetation acts *"locally"* by supplying *indigenous* plants, plants which have evolved on the spot to suit the soil and microclimate of that particular site. This has two advantages, the plants grow well and, more importantly, biodiversity is maintained by preserving local varieties. Biodiversity is all about maintaining the diversity of the existing gene pool, avoiding its reduction by the impact of exotic flora and fauna, or even the same species from another area, which may be distinctly different in a variety of ways. Exotic weeds are a particular concern in this respect, whether plants from overseas or elsewhere in Australia.
The second feature of the company is even more *"thinking locally and acting locally"*, because it concerns the only way that the Murray-Darling Basin can be saved - education. Local education can lead to global benefits and Goldfields Revegetation is informing and education people in many ways, through the retail nursery, TV advertisements, LandCare groups, schools universities and speeches to community groups. Students regularly visit the nursery and sites around Bendigo to learn about land rehabilitation and the importance of indigenous species in preserving biodiversity. Local LandCare groups make use the propagation facilities, free of charge, to produce their own seedlings for revegetation works. Approximately 20 hours per week of Marilyn's time is devoted to voluntary work with community groups.
In 1993, Marilyn received an award from the Australian Minerals and Energy Environmental Foundation for her work on revegetation and community education on environmental management.
The company's premise include plant propagation facilities, retail nursery and environmental shop, all surrounded by Australian natives growing as cut flowers - the Wildflower Farm.

Editor's note:
As someone who has taken students to the nursery on several occasions, I have always enjoyed our visits, always learned a lot and I am always amazed how much time Marilyn can spare for us. It is great to see that she is getting some formal recognition for this.

How about a potted *Callitris glaucophylla* for a Christmas Tree this year?

Marilyn Sprague is selling this native pine in pots. *Callitris glaucophylla,* Murray or White Cypress Pine is classified as a rare plant as its habitat is being continuously eroded.
The cost of the little pines is approximately 6 and 12 dollars.

Bird Observations from September (between Whinghes Swamp and Tang, south side of road)
Author: Alf Howe

Black Swans (100 +)
White-necked Heron (11)
Fairy Martins at every culvert
(at one big brideg there were 50)
White-fronted Chats (2)
Grey Teal (4)
Wood Duck (2)
Pipit (4)
Brown Songlark (2)
White-faced Heron (1)

Near Tang Tang on the roadside was a patch of *Swainsona procumbens* (mauve blue sweet peas).

Fred's Glenluce Wildflower Garden
Author: Peter Ellis

Several years back Bob Allen and I went for a drive down Glenluce way trying to find a beautiful wildflower spot Fred Taylor used to take us back in the early 70's. The country had changed a little, the road we thought was now sealed, although we actually weren't in the spot. I went down again last year but couldn't find Fred's locality. The reason for this expedition was to see if Fred's pure yellow *Pultenea pedunculata* was still there and if the pink form of Silky Tea Tree, which I photographed in those early days (think that shot is in Wildflowers of Bendigo), was in flower. Last spring was very dry and the *Pultenea,* or at least the yellow one, was not to be found and I still couldn't find a pink *myrsinioides*.
On attending a Lilford family reunion this April they had a tour to the old ruins of their ancestors home down Green Gully Road near Glenluce. As we approached the Green Gully Road turn-off from Glenluce, bingo, I got my eye in and right on that intersection was Fred Taylor's wildflower spot and all the Silky Tea. Not in flower then of course.
So two weeks ago I revisited the area. Firstly as you leave Glenluce (after the Springs) the road, which is, gravel winds up a hillside and there on the right cascading over the bank to the roadside edge were carpets of *Pultenea pedunculata* including the beautiful pure yellow form. In fact it had grown very large and I found two other yellow plants as well, plus of course the normal egg and bacon coloured form.
From there if you continue you come to the Green Gully Rd turn-off and the Silky Tea, mainly white was in massed thickets in full flower, just as I remembered it and I found one pale pink flowered plant. Also in flower the lovely yellow form of *Gompholobium hueglei* and Showy Parrot Pea, Blue bells, Wirilda and many other wildflowers. I drove for quite some distance down Green Gully Rd, in fact till I came to Green Gully Track on the right and then turned back for home. There were literally carpets of the *Pultenea* covering the forest floor and bunching up against the tree trunks. This area could be worth a revisit by the club in the next year or two. I would suggest the last weekend in October or the first weekend in November may even be better, say up to about the 10th. I went back last weekend (19th) and the tea tree had finished, and the *Pultenea* past its best, just in one week.

On another note, I think Rosellas have just started nesting in the box I acquired from John Burtonclay about 18 months ago. It is at eye level just off my back verandah and we have this little game of peek a boo every morning. They seem to be there consistently throughout the day, the female usually in the box, but seem to be missing late afternoon to early evening. So not sure if it is really dinkum yet, but I look forward to becoming an uncle.

Report from VFNCA campout (March 2000)

This report is a summary from a long article written by several participants of the campout and brought together by Dick Southcombe, the campout coordinator (Geelong FNC). Please contact Jane Cleary if you would like to read the full write-up.

If you find the program inspiring, you might consider joining the next March campout. Details and contacts were printed in the October Whirrakee.

The VFNCA March 2000 Campout was hosted by the Geelong FNC over the very warm Labour Day long weekend of 10-13 March.

The talks and displays were held at the Barwon Water Auditorium in South Geelong with participants arranging their own accommodation. Over 120 participants from 16 clubs attended.

The program started with a talk by Patrick O'Callaghan from the marine Discovery Centre, Queenscliff. Patrick explored the question:
" How can we define the uniqueness of southern Australia's marine environment?" He reminded us that while we are all familiar with our terrestrial coastal highlights (The Twelve Apostles, The Nobbies, The Prom etc.) and with the power of the southern Ocean, very few of us ever see our magnificent underwater biota *in situ*. For examples images of phytoplankton, the basis of the marine food chain, illustrated the beautiful array of these tiny organisms, including some 'plants with tails' that enable them to manoeuvre to maintain their exposure to sunlight.

Southern Australian waters are certainly not noted for their high productivity (mainly due to low nutrient levels) but they boast high species diversity. This apparent contradiction was explained as a situation in which there was great evolutionary pressure to develop strategies to cope with low food supplies, leading to greater diversity, perhaps similar to the high diversity of terrestrial plants on the poor soils of south western Australia *(or even the poor soils of the Box-Ironbark forest)*. So, is it the sheer diversity of southern Australia's marine biota that we should celebrate? Or that it includes the largest cuttle, or whatever? For Patrick, and probably most of us, it is that a very high proportion of this fantastic diversity is endemic - unique to this part of the world!

One of Saturday's outings was to the Werribee Sewage Treatment farm (now named the Western treatment Plant). Trevor Pescott and Gordon Mcarthy were the guides. Entry now is by permit only (and since the permit lasts for two years, members of the Bendigo, Ballarat and Castlemaine FNC can now make more visits over this time). The farm is huge, 20km by 10 km, with a large number of habitats - farmland lagoons, lakes, swamps and marshlands, saltbush flats, scrublands, paperbarks clumps and coastline. It would take much longer than one day to see it all. Lots of birds were sighted, particularly interesting ones were Golden Headed Cisticola, Blue-billed Duck and Singing Honeyeater.

Another Saturday excursion to Swan and Sand islands (over the causeway from Queenscliff, permit required also, this time form the department of Defence!) showed the process of early plant colonisation as these are relatively young islands. There were lots of birds again and millions of soldier crabs.

An excursion after lunch to the dune and shore flora and fauna was led by Graeme Tribe. The plants all showed signs of water stress (the rainfall had been below average for the last three years). However, the African exotics seemed to be doing rather well! One of the highlights was a colony of five plants of *Olearia lepidifolia*, the last remaining plants on the mainland and it does not have viable seed! This locality also boasted the most westerly occurrence of the Coastal Banksia. The less energetic members spent the Saturday afternoon cruising around Point Lonsdale's spots of interest.

Yet another Saturday activity were several hands-on sessions and a boat trip with the Marine Discovery Centre. These included counting tube worms and pulling them out of their tubes and identifying them. The session on mudflat ecology included collecting samples from Swan Bay, an environment whose food chain is based on Swan poo. The boat trip included collection of sea creatures via a dredge (which reveals many animals and algae never seen washed up on the shore), the visit to the fur seal colony on the ruins of Chinaman's Hat and the colony of Australasian Gannets as well as Pope's Eye, a tiny National Park around some artificially placed rocks.

Saturday evening saw some information exchange with Geoff Howard MP, Member for Ballarat East who explained his role as Parliamentary Secretary for Environment. Clubs had an opportunity to voice their concerns about environmental issues.

Another speaker was Tim Allen, Victorian coordinator of the Marine and Coastal Community Network. Tim enthused the audience about Victoria's marine environment. He developed many convincing arguments *for* parks and *against* opposition to them by especially recreational and commercial fishermen in particular. Just a few examples: in Tasmania and southern Port Philip Bay major declines in both giant kelp and lobsters since 1950, crayfish eat sea urchins which eat algae. Crayfish and kelp ar recovering in Tasmanian *reserves* only. In 1804, 500 crays per night were taken at Pt Nepean. There are *none* there now. Such depletion is occurring everywhere, e.g. Hong kong harbour has nothing left over 10cm long. Bag limits obviously will not avert severe depletion *in an increasing population of gatherers.*
Tim's conclusion, the LCC and ECC have led a Victorian marine and coastal conservation process for 10 years. The year 2000 would be a great one to, at last, celebrate implementation.

The Sunday excursions were to Edwards Point, Mud Island, Black Rock. The Sunday evening talk was about the evolution and animals of Point Lonsdale Shore Platform and the Monday excursions were to Point Lonsdale rock platform, and Ocean Grove Park and Nature Reserve.
Space permitting, they will be summarised in the next Whirrakee.

Diary

The General, Bird Observers Group and Mammal Survey Group meetings are held at the Golden Square Senior Citizens Building, Old High Street, Golden Square, unless otherwise indicated.

General Meeting

Wednesday, December 13, 6:30pm
Christmas Dinner at the Club Rooms
Bring Salad, Casserole or Desert. Come early to inspect the garden then sit down at 6:30pm to dinner. Bring your own Christmas spirit (however, some entertainment is provided).

Note: there is **no January meeting**

Wednesday, February 14th, 7:30pm
On the first meeting of the year, members usually show slides of their holidays or any interesting excursions/discoveries.
Bring yours along.

Spring Cleaning of Clubrooms

This annual event will take place on

Saturday 16th December 9 am till 12 noon.
Please come and help make the place look lovely. Following the Spring Cleaning, members may go on to Jack Ipsen's for the Annual Christmas Picnic. See below for details.

Also on Saturday 16th December.....

Christmas Picnic/BBQ lunch at Lyel Glen.
Jack Ipsen has once again, invited members to join him in the Annual Christmas lunch at his property at Lyel Glen near Redesdale,
Please bring all your food and drink as well as a chair (if you need one). There are plenty of interesting things to see before you sit down for lunch.

Supper
The usual arrangements for supper are as follows: members either bring a plate or pay $1 for supper. This small amount is used to reimburse members who purchase essential supper supplies.

Bird Observers Group

December 3– Marong State Forest.

Atlassing Excursions are conducted on the first Sunday of every month.
Meet 9am at the Clubroom, this is a half-day excursion.
Please contact Anne Bridley (ph. 54 493479) if attending.

Other Events

Summer in the Park 2000

'Possums after Dark'
3rd and 10th February 2001
9pm, Rosalind Park

The mammals study group will again be assisting the City of Greater Bendigo in running this activity

---

Advance Notice
March 2001 Campout

see October *Whirrakee* for details

Advance Notice

Fenner Conference on the Environment 2001
Biodivesity conservation in Freshwaters - same landscape, different perspective 508th July 2001 hosted by the Australian Academy of Science and the Co-operative Research Centre for Freshwater Ecology in Canberra

---

Wildlife Rescue & Information Network Inc.
W.R.I.N. is an organisation dedicated to the care of orphaned, sick or injured native animals.
It is fully endorsed by the Dept of Natural Resources and Environment.
Please call our Emergency Number for Help for Fauna in Need. Phone: 0419 35643